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ABSTRACT

This UNESCO report describes the progress of primary school building development under the second Five Year Plan of the Government of Indonesia. The main objective of the construction program was to increase the enrollement of children of primary school age to 85 per cent of all eligible children. Chapter I provides an historical perspective on primary school construction in Indonesia from the Dutch colonial period to the end of the first Five Year Plan in 1973. Drawing heavily on results of a 1975 survey of the implementation of the national primary school building program in East Java, Chapter II briefly outlines the development of primary education under the second Five Year Plan, 1974-1978. Chapter III discusses the design of the 22,000 school buildings which was standardized except for local variations in materials used. Drawings of alternate site layouts and suggested methods of construction are included. Chapter IV examines the Presidential Instructions to the ministries responsible for implementing the program. Chapter V provides an overview of the instructions of the Minister of Interior to the municipalities. Chapter VI assesses progress and problems of the program. Twelve tables of data and 10 figures as well as several photographs of completed buildings are included in the report. A sample construction contract is appended. (RH)

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UNESCO REGIONAL OFFICE FOR EDUCATION IN ASIA
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INDONESIA

Innovation in the Management of Primary School Construction

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INDONESIA

Innovation in the Management of Primary School Construction

– a Case Study

by Hussin

PS 010096

UNESCO REGIONAL OFFICE FOR EDUCATION IN ASIA AND OCEANIA
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The cover drawing shows an INPRES school built in Bangkalan, on the island of Madura.

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PREFACE

The Government of Indonesia decided that by the end of the second Five-Year Development Plan period, 85 per cent of all children in the 7-12 year age group should be provided with opportunities for education. The decision involved the provision of 7.3 million new places, planned to give a total primary school enrolment of 20.9 million students by the beginning of 1979.

This case study attempts to describe the design of the plan and, more particularly, how a project of such magnitude was and is being managed.

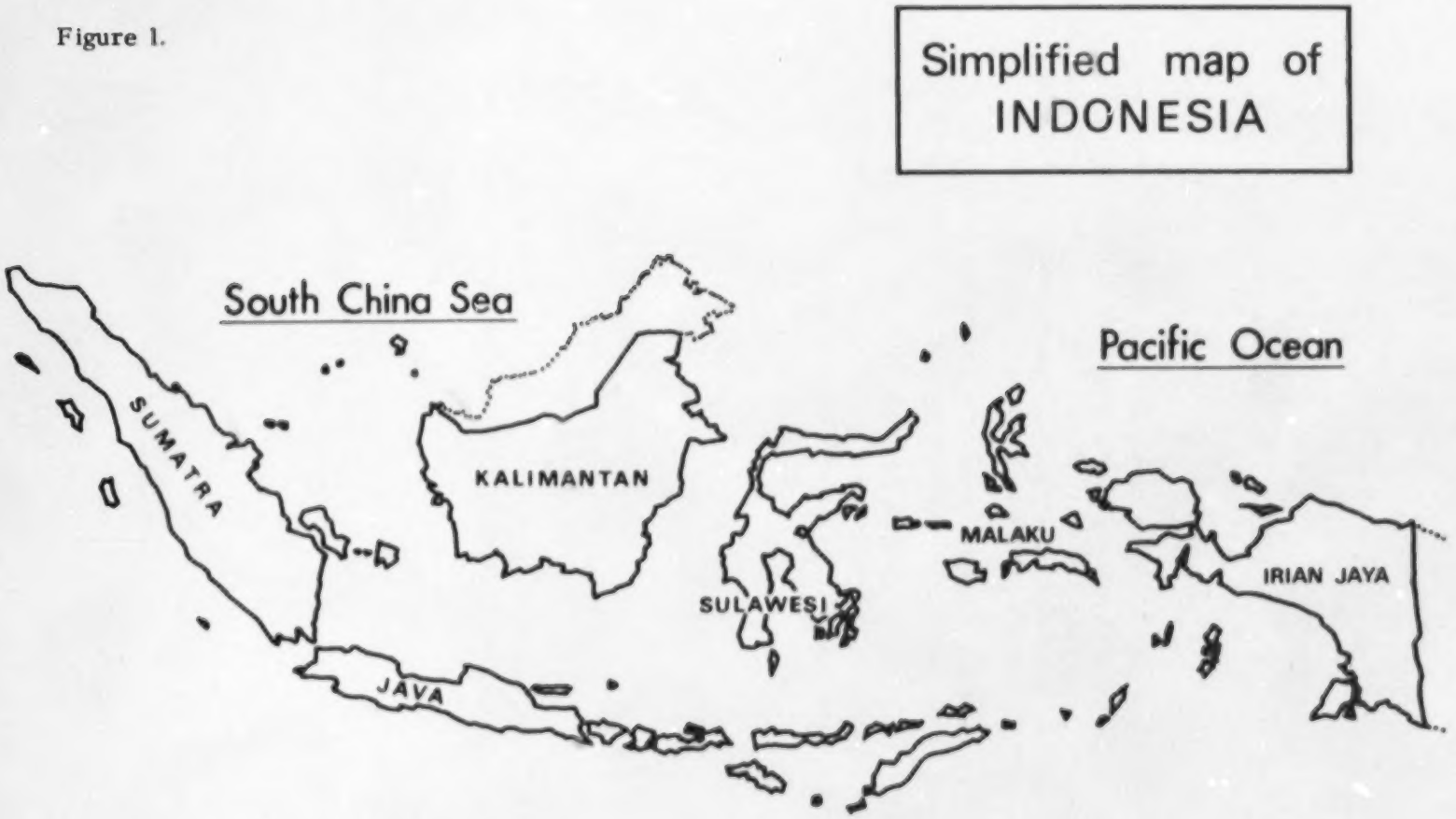
While the focus of the study is on the primary school building construction programme, reference is also made to the larger educational package of which buildings form only a part. This package includes provision for:

Curriculum
Text books
Teaching materials
Buildings
Furniture
Teacher training
Office equipment
Transport for supervisors

As will be evident from this list, the package is designed to bring about not only quantitative expansion but also the qualitative improvement of primary education in Indonesia.

For a clear understanding of the building component of the package, it has to be seen in the context of a difficult geographical situation (Figure 1) and an extraordinarily well developed system of administration at the base of which is a long tradition of self-help in the villages.

Figure 1.


Simplified map of
INDONESIA
South China Sea
Pacific Ocean
SUMATRA
KALIMANTAN
SULAWESI
MALAKU
IRIAN JAYA
JAVA

CHAPTER ONE

PRIMARY SCHOOL BUILDING: THE HISTORICAL PERSPECTIVE

In 1873, there were 229 government primary schools in Indonesia. After a period of 10 years, the number had roughly doubled to 477 [1]. Just 100 years later, in the three year-period 1973-75, the Government planned and constructed 22,000 primary school units.

During the Dutch colonial period, education progressed, but very slowly. Moreover, in the best schools the medium of instruction was the Dutch language. The village child had to attend a second-class institution offering three years of the most rudimentary education (reading, writing and arithmetic and if possible some simple trade). These village schools, moreover, had to be maintained by the people themselves with the Government providing limited support by way of subsidies and educational materials. [2] Needless to say, many villages were without schools, resulting in grave disparities in educational opportunity and attainment.

During the war period, the various kinds of primary school were abolished by the Japanese Military Government and one type was established for all classes of society. This comprised six years of primary education.

The national revolution which resulted in the Proclamation of Independence of 17 August 1945 led to great activity in all fields including education. The latter had to be given a new aim, form and meaning adapted to the new conditions of society and in conformity with the Pancasila, the five philosophical principles on which the Republic of Indonesia is based.

The Constitution of the new Republic clearly showed the attitude of Indonesia towards education: Article 31 enshrined the right of every citizen to the education of his choice and laid down that the authorities should provide for public education and aim at the speedy introduction of compulsory primary education.

In 1950, the changes in education foreseen by the Constitution took shape with the promulgation of the Fundamental Education Act and the establishment of a Ministry of Education, Instruction and Cultural Affairs.

It was at this time, too, that the administration of primary education was changed. Previously the responsibility of several bodies, it was now brought

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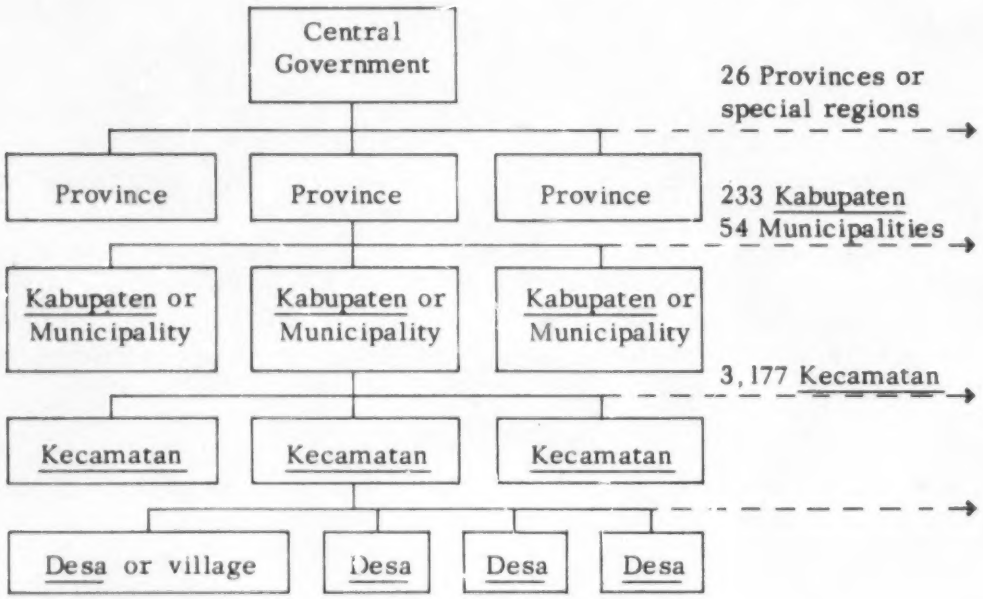
1. H. Kroeskamp. *Early schoolmasters in a developing country - a history of experiments in 19th century Indonesia.* Assen, Van Gorcum, 1974.

2. M. Hutasoit. *Compulsory education in Indonesia.* Paris, Unesco, 1954. (Unesco studies on compulsory education)

under the control of the Central and Provincial Governments. The organization of Government in Indonesia is shown in Figure 2 and has a most important bearing on the implementation of the project described in the chapters that follow.

Figure 2. The organization of Government by Provinces, Kabupaten, Kecamatan and Desa



The Provinces are headed by Governors, the Regencies or Kabupaten by a bupati, and the sub-districts or Kecamatan by a camat. A Municipality has the same status as a Kabupaten.

While an understanding of the structure of government as it affects education is essential, an appreciation of the scale of the problem is equally important. Table 1 gives the number of administrative units at each level in the hierarchy of responsibility.

Table 2 gives the population at the end of 1973, and Table 3, the enrolment of children in Government primary schools by Province in 1972.[3]

The figures in brackets in Table 3 give the number of children in primary school in 1972, expressed as a percentage of the population in each Province in the same year (adjusted from the 1973 data given in Table 2). It will be seen that while there were no longer wide disparities in the percentage enrolments

3. In addition to the Government primary schools, there are a substantial number of Madrasahs or Moslem primary schools which are controlled by the Ministry of Religious Affairs and are not included in the programme which forms the subject of this Educational Building Report. In 1971, the total number of primary schools was 78,412, of which 13,922 or 17.8 per cent were Madrasahs - see Setijadi, Primary Education in Indonesia in *Bulletin of the Unesco Regional Office for Education in Asia*, no. 14, June 1973, p. 39.

between the Provinces, the number of children attending school in 1972 was far below the total number of children of primary school age, assuming this number to be approximately 18 per cent of the total population.

Table 1. Administrative units in Indonesia

No	Province	Number of Kabupaten*	Number of Kecamatan
1	Aceh	8 (2)	130
2	North Sumatra	11 (6)	177
3	West Sumatra	8 (6)	85
4	Riau	5 (1)	67
5	Jambi	5 (1)	36
6	South Sumatra	8 (2)	84
7	Lampung	3 (1)	61
8	Bengkulu	3 (1)	23
9	West Java	20 (4)	385
10	Jakarta Raya	- (5)	25
11	Central Java	29 (6)	492
12	Yogyakarta	4 (1)	74
13	East Java	29 (8)	544
14	West Kalimantan	6 (1)	108
15	Central Kalimantan	9 (1)	80
16	South Kalimantan	9 (1)	87
17	East Kalimantan	4 (2)	70
18	North Saluwesi	4 (2)	81
19	Central Sulawesi	4	61
20	South Sulawesi	21 (2)	167
21	South East Sulawesi	4	43
22	Bali	8	50
23	West Nusatenggara	6	56
24	East Nusatenggara	12	99
25	Maluku	4 (1)	51
26	Irian Jaya	9	33
	Total	233 (54)	3, 177

Source: Indonesia. Central Bureau of Statistics. Statistical pocket book: Indonesia 1974/1975. Jakarta, 1975.

* The figures in parenthesis are municipalities which are in addition to the Kabupaten

Table 2. Population by Province at the end of 1973

No.	Province	Population	No.	Province	Population
1	Aceh	2, 120, 934	14	West Kalimantan	2, 139, 857
2	North Sumatra	6, 917, 247	15	Central Kalimantan	751, 573
3	West Sumatra	2, 898, 184	16	South Kalimantan	1, 779, 741
4	Riau	1, 743, 173	17	East Kalimantan	785, 491
5	Jambi	1, 063, 301	18	North Sulawesi	1, 788, 657
6	South Sumatra	3, 626, 528	19	Central Sulawesi	966, 358
7	Lampung	2, 949, 526	20	South Sulawesi	5, 396, 213
8	Begkulu	550, 700	21	South East Sulawesi	744, 569
9	West Java	22, 125, 121	22	Bali	2, 174, 105
10	Jakarta Raya	4, 645, 797	23	West Nusatenggara	2, 171, 451
11	Central Java	22, 574, 509	24	East Nusatenggara	2, 385, 136
12	Yogyakarta	2, 552, 719	25	Maluku	1, 178, 559
13	East Java	25, 982, 402	26	Irian Jaya	982, 201
				Total	123, 086, 052

Source : Indonesia. Central Bureau of Statistics. Statistical pocket book: Indonesia 1974/1975. Jakarta, 1975.

Table 3. Enrolment of children in primary school by Province, 1972

No	Province	Enrolment	Per cent of Population
1	Aceh	191,235	9.23
2	North Sumatra	945,648	14.0
3	West Sumatra	394,265	13.93
4	Riau	193,449	11.36
5	Jambi	110,974	10.69
6	South Sumatra	453,559	12.81
7	Lampung	301,004	10.45
8	Bangkulu	66,518	12.37
9	West Java	2,050,427	9.49
10	Jakarta Raya	524,852	11.57
11	Central Java	2,309,690	10,48
12	Yogyakarta	346,320	13,89
13	East Java	2,353,286	9.27
14	West Kalimantan	194,670	9.32
15	Central Kalimantan	88,945	12.12
16	South Kalimantan	166,599	9.63
17	East Kalimantan	96,998	12.65
18	North Sulawesi	310,113	17.76
19	Central Sulawesi	156,479	16.58
20	South Sulawesi	609,713	11.57
21	South East Sulawesi	100,294	13.79
22	Bali	235,368	11.09
23	West Nusatenggara	192,523	9.08
24	East Nusatenggara	343,416	14.74
25	Maluku	173,857	15.11
26	Irian Jaya	121,346	12.65
	Total	13,030,548	10.84

Source: Indonesia Central Bureau of Statistics. Statistical pocket book: Indonesia 1974/1975. Jakarta, 1975.

Thus, of the population of roughly 20 million children of primary school age in 1972, only some 13 million were enrolled in Government primary schools - that is, about 65 per cent (although some three-quarters of a million other children were enrolled in Madrasahs [3]). It was the Government's intention to change this situation through massive investment in an educational package, the building component of which forms the focus of the present case study.

The difficulties faced in providing school buildings for a large, planned increase in enrolment in such a short time were considerable. From 1951 to 1954, the responsibility for construction had been that of the Provincial Governments, subsidized by the Central Government. This proved too great a burden on the economy of a nation not yet 10 years old, and in 1954 subsidies from the Central Government for primary school construction ceased, the total financial responsibility being transferred to the Provincial Governments and to local communities.

It was at this time, too, that the Provincial Governments encouraged communities to organize Compulsory Education Boards, one of the functions of which was the construction of primary school buildings. In this way advantage was taken of the long standing Indonesian tradition of self-help.

But despite these efforts, which resulted in good initial progress, Table 4 shows that from 1966 onwards enrolment in primary schools remained virtually stagnant, and in consequence, construction programmes slowed almost to a halt.

Obviously the financial burden of providing buildings from provincial and community resources had proved too heavy and there was a need to revert to a system of subsidies from the Central Government if the building to accommodate the planned enrolment increases were to be provided.

Table 4. Total enrolment in primary education, 1951-1973

Year	Enrolment	Year	Enrolment
1951	5,318,014	1970	12,856,092
1960	8,955,098	1971	12,896,147
1966	11,577,943	1972	13,030,548
1968	12,463,495	1973	13,069,456
1969	12,602,415		

It was also clear that if the enrolment was to be raised substantially, the number of buildings to be constructed would require not only very large investment, but also careful consideration as to how the money should be distributed between Provinces, as well as the development of machinery to ensure that the right sort of buildings were built at places where they were needed - all matters complicated by the geography of the Republic.

The history of school building design in Indonesia is characterized by the continued use of the same local materials as those for housing - the inevitable outcome of the insistence of the Government during the Dutch period that the village populations should construct their own schools. Thus the schools were built using the various palms, bamboos and other grasses which abound in Indonesia and the lime which is also commonly found in many places in the archipelago.

In the early part of the 19th century, the school building comprised one single large space. As education developed, the government inspectors slowly introduced the idea of dividing this space up into classrooms, and by the end of the century the three-classroom school was fairly common. By 1916, a "standardized building" regulation was issued by the Director of Public Works [4] which prescribed the design (but not the method of construction) of school buildings. This regulation was followed until 1945. Its main stipulations were:

Rooms

Four rooms, each 7 x 8 metres; three rooms, each 7 x 7.5 metres
Corridors: 2.50 metres wide
Ceiling height: 5 metres
Floor: 30 centimetres above ground level

Orientation and illumination

Major axes to be east-west; sky to be visible from every desk; daylight to fall on desks from the left; more daylight from the left than the right.

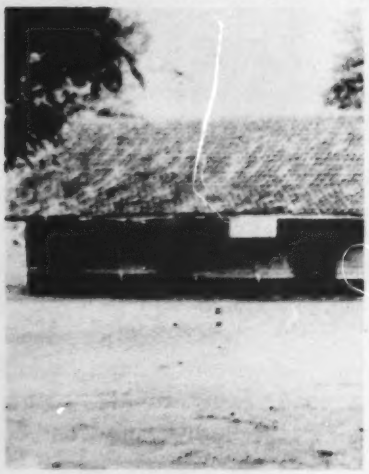
4. B.O.W. No. 1726/a/1916

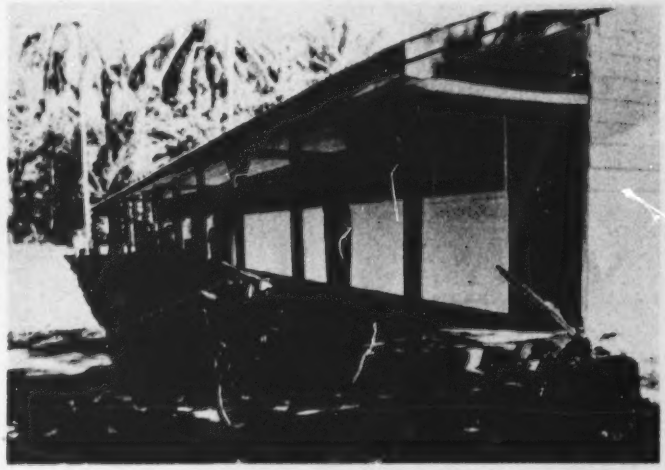
Toilets
The number of fittings (urinals and closets) was prescribed for a variety of situations.

Playroom
Half the classroom area, and only to be built in places experiencing heavy rain.

Guard's room
10.5 square metres with kitchenette
Flagpole, fence and shade trees

The photographs below illustrate some typical schools built in the period before independence - schools which provide a reasonable standard of accommodation, and which today's architects have found necessary to modify rather than change fundamentally. These modifications are discussed later on.





CHAPTER TWO

DEVELOPMENT OF PRIMARY EDUCATION UNDER THE SECOND FIVE-YEAR PLAN, 1974-78

The first Five-Year Development Plan succeeded in increasing enrolment of primary school students by 0.8 million to over 13 million in 1973. It was estimated that, by the end of the second Five-Year Plan, primary school enrolment would have reached more than 20 million. [1] Some 85 per cent of children of primary school age would then be attending school.

The achievement of this target was foreseen in the Plan document to depend on the construction and furnishing of new school buildings, the training and supply of teachers to existing and new schools, the development of a new curriculum (including preparation and distribution of text books related to the main curriculum area), the provision of libraries and reading material and improvement in supervision of the educational process.

In the last three years, the sum allocated for the achievement of the school building construction programme alone amounted to the equivalent of more than 163 million US dollars.

While the purpose of this study is to describe the progress of school building development under the second Five-Year Plan, it is appropriate to describe briefly in this chapter some of the more general outcomes of the plan for the development of primary education, based on a survey of a stratified sample of 56 villages (desa) in the Province of East Java. [2]

As the main objective of the programme was to increase the enrolment of children of primary school age to 85 per cent, it is to this that reference should first be made. Table 5 gives the enrolment in schools in the 56 villages, and shows that by 1975 the participation rate had reached 89.7 per cent although if the pupils from outside the villages are discounted, the rate falls to 79.2 per cent. This suggests that the programme has been a decisive factor in increasing enrolment, which was the Government's main aim.

Another important fact revealed by the survey seems to be that the programme has increased educational opportunity for the poor, as can be seen in

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1. Indonesia. *Draft Second Five-Year Plan, 1974-1978; Chapter 22: Education and development of the young generation.* Unofficial translation by BPP.

2. Indonesia. Provincial Office of the Ministry of Education and Culture, East Java. *Summary of results of a study of the implementation of the national primary school building programme in East Java, 20 March-30 June 1975.* [Surabaya] PROPPIPDA, 1975.

Table 6. There remains, however, a substantial proportion of children of the poorest parents who, probably due to their extreme poverty, have not yet enrolled.

Table 5. Enrolments by type of school in 56 villages in East Java, 1973-1975

Type of primary school	Total Students, Grade I		
	1973	1974	1975
Established Government primary schools	3,670	3, 614	3,224
Private primary schools and religious primary schools	986	1,268	1,685
The new schools built under the programme	-	4,303	4,165
Total	4,656	9,185	9,074

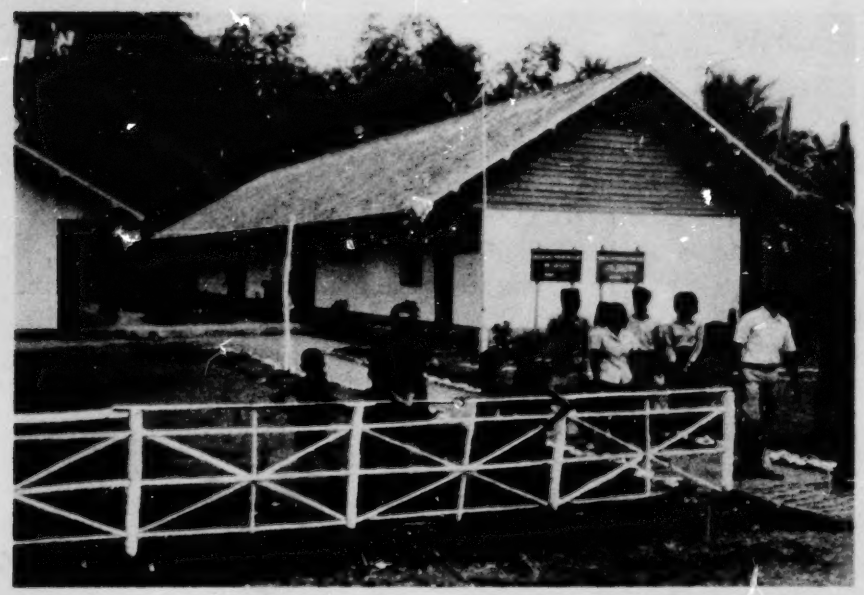
Table 6. Enrolments in relation to economic status of parents (expressed as percentages of total number of pupils in each category)

Status of parents / Pupil category	well-off	average	poor
Government primary school pupils	5.8	53.8	40.4
Religious primary school pupils	12.5	48.7	38.8
New pupils in the new schools	3.6	33.6	62.
Children not in school	1.0	11.9	87.1

Of the 106 buildings completed in the villages included in the survey (Photos on page 9 show typical examples), all have been provided with desks and chairs for pupils and teachers, and with cupboards and blackboards. The distribution of books was also found to have proceeded smoothly although some schools had yet to be supplied.

Most of the teachers in the new schools (91 per cent) had already participated in an upgrading course, mainly in mathematics and the Indonesian language.

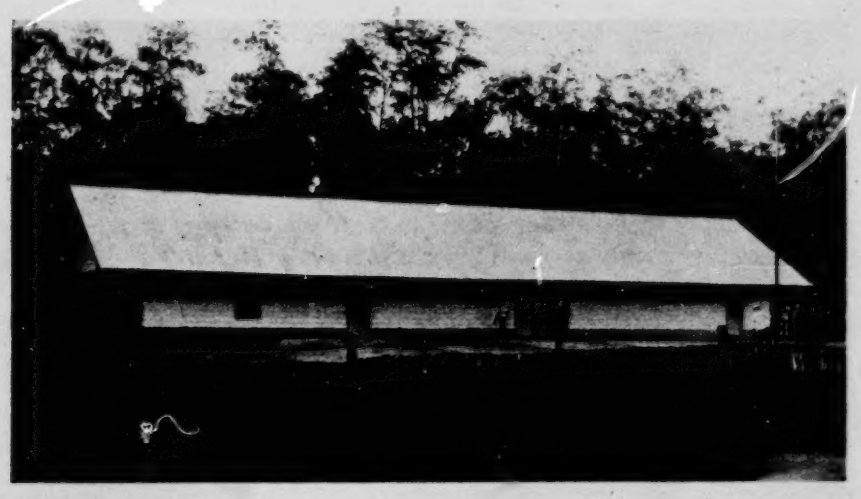
Perhaps the most significant feature of the programme from the viewpoint of this case study was the participation of the community in the 56 villages surveyed. One-third of all the community leaders and parents had contributed their labour in both years of the construction programme and 7 per cent of all parents had contributed money or materials for school building construction.



INPRES school unit erected in Madura, East Java. Brick walls, clay-tiled roof.

The East Java Study[3] concludes that the results of the stratified sample are applicable to the Province of East Java as a whole, and that the programme has been a success because it has raised enrolments and resulted in significant official and community participation in a programme of wide application.

As East Java has been allocated over 20 per cent of all the new schools to be built in Indonesia under the present programme, the impact on primary education in Indonesia as a whole is likely to be very great.



INPRES school unit erected in southern Sumatra. Timber-framed walls, corrugated iron roof.

3. *Ibid.*

CHAPTER THREE

THE PRIMARY SCHOOL BUILDING

As is usual in all construction programmes of wide application - in this case the construction of 22,000 buildings, planned for the period 1973 to 1976 - the Government decided to use one standard design. Those responsible for the construction of the individual buildings were required, however, to use local building materials, with the criterion that such materials should have a minimum durability of 15 years.

In regulating the construction programme in this way, the Government removed the possibility of sharp disparities arising between one Province and another in the design of the facilities provided. At the same time, it ensured the feasibility of constructing schools anywhere in the Republic by insisting that only locally available materials and building practices were utilized. Table 7 shows the wide variety of materials used for schools in the various Provinces.

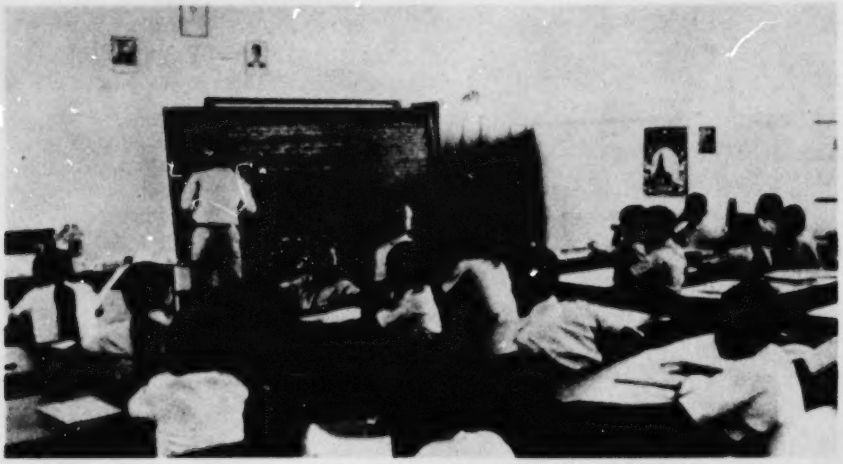
Table 7. Building materials used in school construction depending on local availability

Building element	Materials
Foundations	River stone; brick; wooden piles (in tidal or riverine areas)
Walls	Brick; wood; plastered brick; trass-lime blocks
Floors	Tile; stone; cement screed on brick; timber
Ceilings	Asbestos cement sheet; lath and plaster
Roof coverings	Asbestos cement sheet; tiles; galvanized iron, iron-wood shingles

The facilities provided at each phase of construction comprised three classrooms, each equipped with chalkboards, bookcases, tables and chairs and a toilet unit at the end of the classroom block. The basis for the classroom design and the supply of furniture was a maximum teaching group of 40 children. Each school was ultimately to have six classrooms, in two buildings of three classroom each. A teachers' room was included when the first group of three classrooms was constructed.

The Government distributed complete sets of drawings to those responsible for construction[1]. These drawings, apart from giving essential information on dimensions of the classrooms and other accommodation elements, suggested a

1. Included in Presidential Instruction No. 6 of 1974, *Guidelines for the realization of the aid programme for construction of primary schools in Indonesia*, translated from the Indonesian original by Mrs. T.G. Djaka, Bangkok, Unesco, 1975.



Interior of an INPRES classroom

number of alternative positions of the two three-classroom buildings relative to each other on the site (Figure 3).

Because a new school having classrooms for six grades could not be occupied all at once, and also because of the heavy expenditure involved, the Government decided to arrange for the construction in two phases. The first phase provided three classrooms, toilet and teachers' room and the second phase an additional three classrooms with an attached toilet.

In addition to information on the relationships of the two small buildings to each other, drawings were provided with Presidential Instruction No. 6[2] which gave guidance on the construction of the buildings in general (Figure 4) and of the roof in particular (Figure 5). Perspective sketches of the buildings were also given (Figure 6). The sketches were important because they showed the people the sort of building they would have when the work was finished, and this probably contributed indirectly to the enthusiasm with which the communities participated in the construction work.

An analysis of the space provided in the completed six-classroom school is of particular interest. For a design capacity of 40 children per class and 240 children in each school, the design provided a per-place area in each classroom of 1.31 square metres and a gross per-place area (for the school as a whole) of 2.062 square metres. Table 8 gives a comparison of the place in the INPRES schools[3] with that in primary schools in a number of other countries of the Asian region[4]. The average gross per-place area for the cases listed is 2.63 square metres, with a spread from 0.58 to 8.05 square metres.

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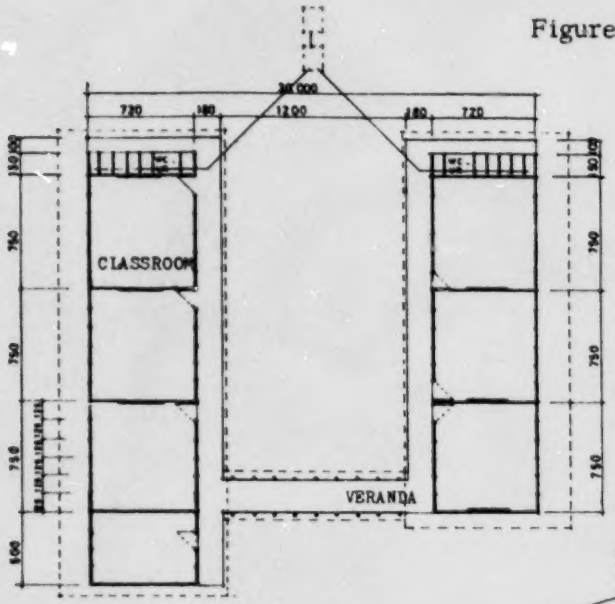
2. *Ibid.*

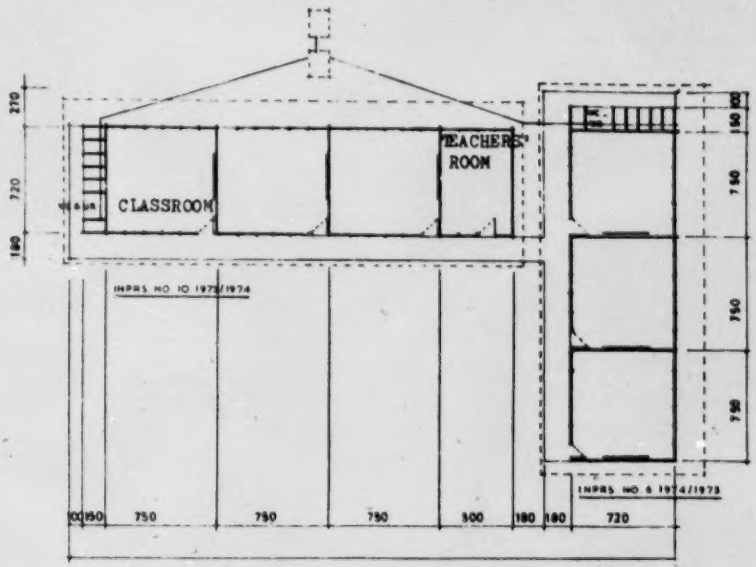
3. The schools in the programme described in this Report are known in Indonesia as SD INPRES. In the Indonesian language, this would be expanded to mean *Sekolah Dasar Instruksi Presiden* and in English, Presidential Indstruction Primary Schools.

4. Unesco. Regional Office for Education in Asia, Bangkok. Educational building and facilities in the Asian region. *Bulletin of the Unesco Regional Office for Education in Asia*, No. 17, June 1976.

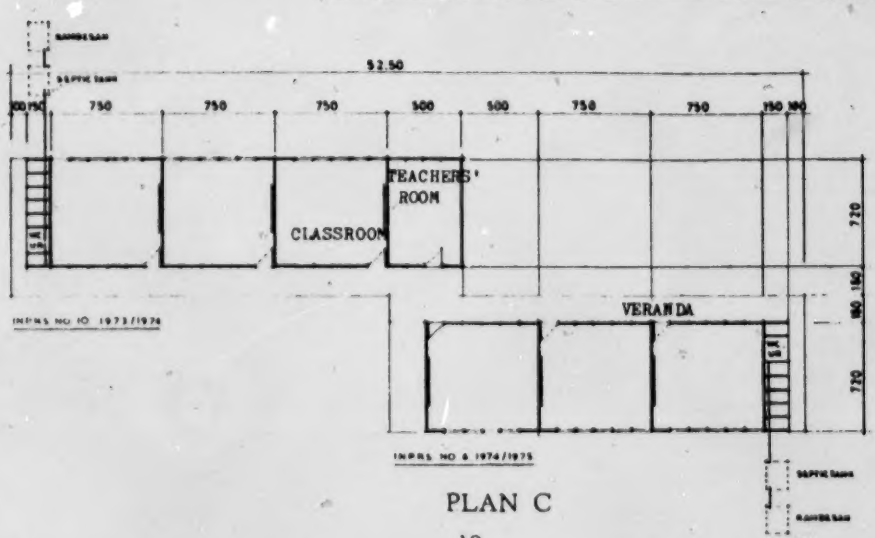
Figure 3. Alternative positions of the primary school buildings relative to each other on the site



PLAN A



PLAN B



PLAN C

Figure 4. Suggested general method of construction

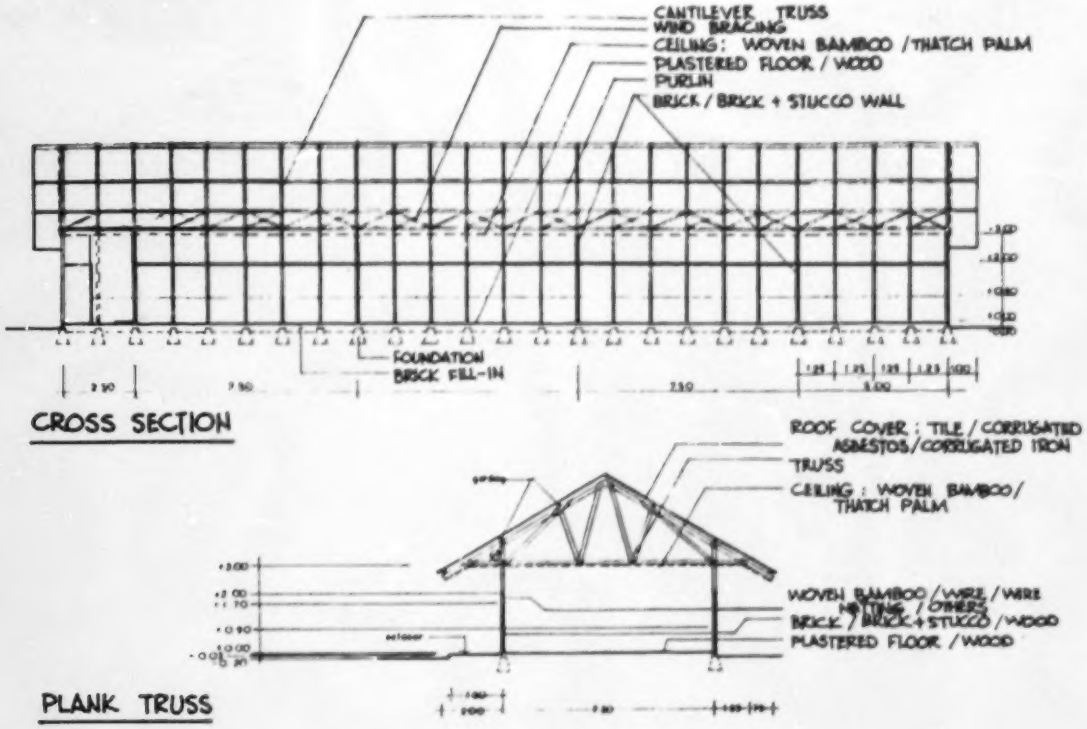

CANTILEVER TRUSS
WIND BRACING
CEILING: WOVEN BAMBOO / THATCH PALM
PLASTERED FLOOR / WOOD
PURLIN
BRICK / BRICK + STUCCO WALL
FOUNDATION
BRICK FILL-IN
CROSS SECTION
ROOF COVER : TILE / CORRUGATED ASBESTOS / CORRUGATED IRON
TRUSS
CEILING : WOVEN BAMBOO / THATCH PALM
WOVEN BAMBOO / WIRE / WIRE NETTING / OTHERS
BRICK / BRICK + STUCCO / WOOD
PLASTERED FLOOR / WOOD
PLANK TRUSS

Figure 5. Suggested method of construction of roof

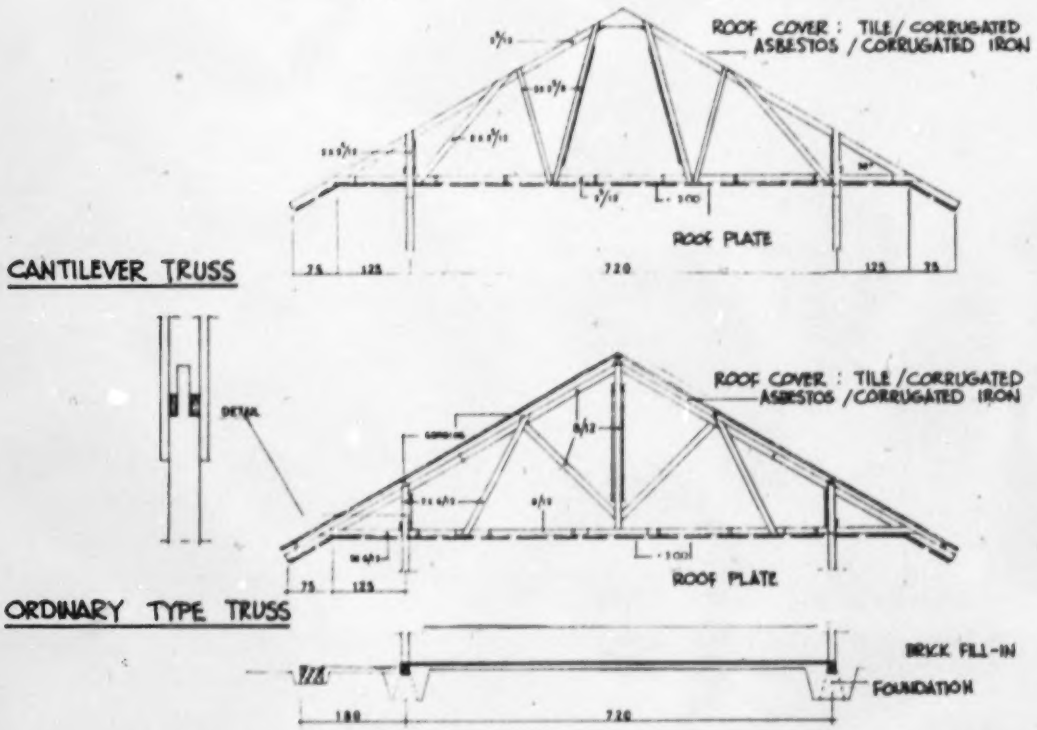
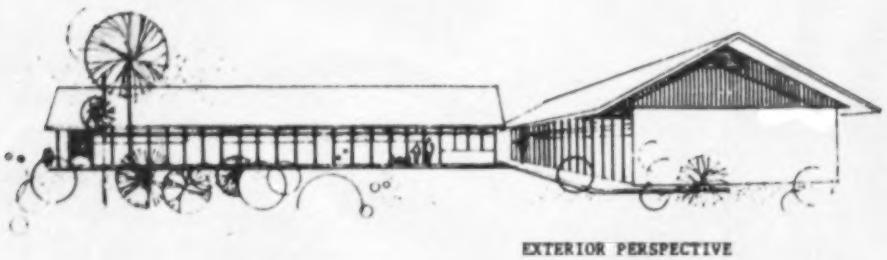
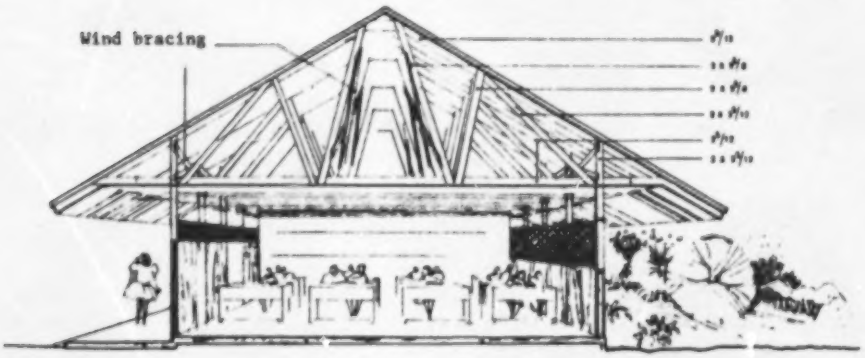


Figure 6. Perspective sketches of school



EXTERIOR PERSPECTIVE



CROSS SECTION PERSPECTIVE

Table 8. Analysis of per place areas of the INPRES schools and other primary schools in some countries of the Asian region.

Country	Year	Gross area per place square metres	Percentage of total area used as teaching space
Afghanistan	1975	1.42	87.8
Australia	1974	2.94	58.8
Bangladesh	1969	1.01	80.0
India			
- Tamil Nadu	1953	1.09	66.5
- Uttar Pradesh	1960	1.28	71.3
INDONESIA INPRES	1973-75	2.06	63.5
Japan	1970	8.05	61.5
Republic of Korea	1975	1.31	55.1
Nepal	1969	0.58	84.5
New Zealand	1973	3.46	62.7
Pakistan	1975	0.85	73.6
Singapore	1975	7.87	54.7
Sri Lanka	1976	1.57	69.4
Thailand	1964	3.27	53.0

The INPRES schools, it can be concluded, provide not only a very reasonable type of accommodation - including classrooms, teachers' room and toilet - but also, by comparison with the schools of other countries, adequate space for the normal curricular and extra-curricular activities of a primary school.

CHAPTER FOUR

THE PRESIDENTIAL INSTRUCTIONS AND MINISTERIAL REACTIONS

The building programme which forms the subject of this case study draws its authority from the following Presidential Decrees or Instructions:

Presidential Instruction No. 10 of 1973
Presidential Instruction No. 6 of 1974
Presidential Instruction No. 6 of 1975

Entitled "The Instruction of the President of the Republic of Indonesia concerning the Aid Programme for the Construction of Primary Schools", the three documents include as their first and possibly most important clause, a directive for the realization of the school construction addressed to six different Ministers: the Minister of Interior; the Minister of Education and Culture; the Minister of Finance; the Minister of Public Works and Electric Power; the State Minister for Economy, Finance and Industry who is also the chairman of National Development Planning; and the State Minister for the Reorganization of Government Administration.

The unique quality of the clause springs from its breadth of application. In some countries, a decision to embark on a school construction programme would, either directly or by implication, be part of the national development plan. The implementation of the programme, however, would usually be strictly the concern of the Education Minister and possibly, where schools are built by the Public Works agency, this concern would be shared with the Minister of Public Works.

The intention of the Presidential Instructions, it seems clear, was to allocate responsibility to all of the Ministers concerned, thus ensuring that there was proper detailed planning (Chairman of the National Development Planning Board), that funds for construction were available and, more important, that an organization for their disbursement was established (Minister of Finance); that the schools required were properly described and that teachers and equipment were provided to man them (Minister of Education and Culture); that a suitable building design was prepared and technicians were made available to advise on construction (Minister of Public Works); and finally, that the Provincial Governors and their organizations were geared to assist at the local level in site selection and acquisition and mobilization of community resources for the construction process (Minister of the Interior).

Here was a complete organizational plan with a framework in which, together with inter-ministerial meetings at various levels from the Ministers themselves downwards, the programme could be developed and obstacles discussed and overcome as they arose.

The Presidential Instruction (which in English translation runs to 6 pages) did not, however, rely solely on effective inter-ministerial collaboration for the achievement of the programme, but went on to set out in very precise terms exactly what was to be done. Instruction No. 6 of 1974, for example, in its 12 clauses, specifies that 6,000 three-classroom buildings are to be constructed on the same sites as the 6,000 built under the 1973 Instruction. The accommodation to be provided in each building is described. The unit costs per building are given for each of the different regions and it is directed that the money be channelled through the Treasury to the (local) Bank Rakyat Indonesia (BRI), the Indonesian People's Bank. The role of the Regional Governments in acquiring land and in enlisting community support for the programme is described. The exact period during which the buildings are to be constructed is specified (April-December 1974). Finally, the onus for ensuring the smooth operation of the programme is placed on the "appropriate Ministers concerned". The documents are signed by the President of the Republic.

Presidential Instruction No. 6 of 1974 was signed by the President on 27 April of that year. As it required that the 6,000 buildings were to be ready for use by January 1975, it clearly brooked no delay. Two days later, on 29 April, the Ministers of Interior, Education and Culture, Finance and the State Minister for National Development Planning, issued a Joint Decision giving "Guidelines for the realization of the aid programme for the construction of primary schools".

After a preamble which rehearses the content of the Presidential Instruction and provides appropriate references to the Ministerial decisions which regulated the construction of the first 6,000 buildings in 1973, built under Presidential Instruction No. 10/1973, the Guidelines set out in greater detail Joint Ministerial instructions on : (a) the supply of land; (b) the leadership and financial control of the project; (c) the responsibility for operation/construction; (d) payment procedures; and (e) reporting and supervision.

The Guidelines conclude with instructions on textbooks, appointment of teachers, activities of inspectors and the supply of supplementary reading materials. As these last four points are not directly relevant to this case study, they are included here merely to illustrate that the provision of education was considered by those planning the project as the delivery of a whole system, an important point which is not always so concisely enunciated.

The Guidelines conclude with annexes which indicate at once the detailed nature of the planning effort that contributed to the project design. Of special interest is Annex 2 in which the exact number of buildings to be constructed in every Kabupaten of every Province is given, together with the allocation of money to that Kabupaten. In all, the 6,000 buildings to be constructed in 1974 were divided, in the Annex, among 299 Kabupaten and Municipalities, the total financial allocation representing over US $38 million. Table 9 summarizes the allocation of buildings and funds for the Republic as a whole. From this it can be seen that the average investment in construction of each of the simple, three-classroom buildings was US $6,470 or (as each building was designed to house 120 children), US $53.9 per place. This figure, to which would have to be added the value of any community contribution, compares very favourably indeed with

per-place construction costs for primary schools in other countries of the region, as is shown in Table 10.[1]

Table 9. Allocations of primary school buildings and funds for construction by Province/Region - Budgetary Year 1974-75

Province/ Region	Allocation of buildings	Allocation of funds (US dollars*)	Province/ Region	Allocation of buildings	Allocation of funds (US dollars*)
Aceh	135	815,663	West Kalimantan	120	727,711
North Sumatra	187	1,139,759	Central Kalimantan	85	514,458
West Sumatra	90	545,783	South Kalimantan	95	579,518
Riau	80	489,157	East Kalimantan	75	460,241
Jambi	50	308,434	North Sulawesi	85	614,458
South Sumatra	150	921,687	Central Sulawesi	65	469,879
Lampung	130	793,976	South Sulawesi	220	1,590,361
Bengkulu	50	306,024	South East Sulawesi	50	361,446
West Java	1 173	7,109,638	Bali	90	542,169
Jakarta Raya	78	1,315,663	West Nusatenggara	130	939,759
Central Java	1,063	6,420,482	East Nusatenggara	105	759,036
Yogyakarta	85	528,916	Malaku	55	463,855
East Java	1,438	8,707,229	Irian Jaya	116	1,397,590
			Total	6,000	38,822,892

* Conversion rate : US$1 to 415 Rupiahs

Table 10. Comparison of average per-place allocation of funds for the INPRES schools with per-place costs of primary schools in some other countries of the Asian region

Country	Year	Per-place cost (US$)	Country	Year	Per-place cost (US$)
Afghanistan	1975	48.23	Japan	1970	829.59
Australia	1974	939.47	Korea, Rep. of	1975	46.25
Bangladesh	1969	7.94	Nepal	1969	20.95
India			New Zealand	1973	974.58
- Tamil Nadu	1953	6.07	Pakistan	1975	69.52
- Uttar Pradesh	1960	8.13	Singapore	1975	177.32
INDONESIA INPRES	1974	53.90	Sri Lanka	1976	78.95
			Thailand	1964	136.24

Subsequent to the Guidelines issued following the Joint Decision of the Ministers on 29 April 1974, the individual Ministers issued 'Further Guidelines' dealing with matters within their respective areas of competency.

Thus, on 17 June 1974, the Minister of the Interior issued Instruction No. 18 of 1974 in which all Governors, Regents[2] and Mayors were informed of the broad outline of the Presidential Instruction and of the Joint Decision of the Ministers, and were assigned the task of supervising and implementing the construction

1. Unesco, *Educational building and facilities.* p. 29

2. A Regent is known as a '*bupati*' - see Chapter One.

programmes in their own areas. The instruction is sufficiently comprehensive and important to warrant examination in the next Chapter.

The remaining 'Further Guidelines' may conveniently be listed and annotated here, although most of them are concerned with the educational rather than the constructional part of primary education development. They are:

1. Guidelines for implementation of the programme for supplying motorized vehicles (for supervision of education), issued jointly by the Ministers of the Interior, Education and Culture, Finance and the State Minister for Economy.
2. Guidelines for implementation of a programme for the supply of key textbooks and a programme for the upgrading of teachers.
3. Guidelines for the implementation of a programme for supplying supplementary reading material to primary school children.
4. Guidelines for implementation of the appointment of State primary school teachers, issued by the State Minister for State Administration Reform on 11 June 1974.
5. Guidelines for reporting procedures, issued by the Minister of Interior.
6. Clarification of the construction plan for primary school buildings (comprising the schedule of accommodation, brief specification notes and the drawings mentioned in Chapter Three above).

Finally, it should be recalled that the outline given above describes the series of actions, Presidential and Ministerial, taken in respect of the 1974 INPRES programme. Similar actions were taken in respect of the previous 1973 INPRES programme (6,000 buildings) and of the later 1975 INPRES programme (10,000 buildings). In all, the years 1973-75 saw the construction of 22,000 buildings and the programme continued into 1976. It is summarized in its entirety in Tables 11 and 12.

Table 11. Number of schools constructed annually, 1973-75

Province	Phase I 1973-74	Phase II 1974-75	Phase III 1975-76	Province	Phase I 1973-74	Phase II 1974-75	Phase III 1975-76
Aceh	135	135	190	West Kalimantan	120	120	240
North Sumatra	180	187	790	Central Kalimantan	85	85	95
West Sumatra	90	90	210	South Kalimantan	95	95	280
Riau	80	80	170	East Kalimantan	75	75	60
Jambi	50	50	130	North Sulawesi	85	85	130
South Sumatra	150	150	210	Central Sulawesi	65	65	80
Lampung	130	130	255	South Sulawesi	220	220	380
Bengkulu	50	50	45	South East Sulawesi	50	50	70
West Java	1,160	1,173	1,760	Bali	90	90	230
Jakarta Raya	200	78	200	West Nusatenggara	130	130	305
Central Java	1,050	1,063	1,845	East Nusatenggara	105	105	115
Yogyakarta	85	85	150	Maluku	55	55	60
East Java	1,415	1,438	1,925	Irian Jaya	50	116	75
				Total	6,000	6,000	10,000

Table 12. Annual financial allocations to Provinces for construction of primary school buildings, 1973-75

Province	Allocation of funds (US dollars)			Province	Allocation of funds (US dollars)		
	Phase I 1973-74	Phase II 1974-75	Phase III 1975-76		Phase I 1973-74	Phase II 1974-75	Phase III 1975-76
Aceh	815,663	815,663	1,843,373	West Kalimantan	727,711	727,711	2,345,783
North Sumatra	1,089,139	1,139,759	7,657,831	Central Kalimantan	514,458	514,458	925,301
West Sumatra	545,783	545,783	2,039,759	South Kalimantan	579,518	579,518	2,759,036
Riau	489,157	489,157	1,648,193	East Kalimantan	460,241	460,241	590,361
Jambi	308,434	308,434	1,267,470	North Sulawesi	614,458	614,458	1,409,638
South Sumatra	921,687	921,687	2,049,397	Central Sulawesi	469,879	469,879	867,470
Lampung	793,976	793,976	2,471,084	South Sulawesi	1,590,361	1,590,361	4,120,482
Bengkulu	306,024	306,024	437,349	South East Sulawesi	361,445	361,446	759,036
West Java	7,031,213	7,109,638	17,000,000	Bali	542,169	542,169	2,267,470
Jakarta Raya	1,445,783	1,315,663	4,096,385	West Nusatenggara	939,759	939,759	3,307,229
Central Java	6,342,067	6,420,482	18,598,795	East Nusatenggara	759,036	759,036	1,246,988
Yogyakarta	528,916	528,916	1,473,494	Malaku	463,855	463,855	722,891
East Java	8,525,301	8,707,229	18,598,795	Irian Jaya	602,410	1,397,590	1,174,699
				Annual Totals	37,768,444	38,822,892	101,678,309

CHAPTER FIVE

AN ANALYSIS OF THE INSTRUCTIONS OF THE MINISTER OF INTERIOR

Considering the second, 1974-75 phase of the three-phase project as an example, it is evident that the key document in the Guidelines[1] is that of the Minister of Interior, Instruction No. 8 of 17 June 1974. This Instruction comprises four distinct elements as follows:

1. A description of the work to be done and of the unit costs of the buildings to be constructed.
2. Assignment of responsibility for:
   a) execution of the construction work and its supervision;
   b) distribution of money to pay for the work.
3. Methods of reporting on implementation.
4. Annexes including a plan of work and proforma report forms and form of building contract.

Each of these elements is worth discussion to show the level of detail into which the Instruction went, for this, as will be seen, had a decisive effect on the success of the programme.

The buildings to be constructed in the second, 1974-75 phase of the three-phase programme comprised simple blocks of three classrooms, each block with a toilet, and having a total area of 219 square metres. Furniture for 120 pupils and three teachers was included.

The funds to be provided for one building and its furniture were precisely calculated and varied from place to place, having regard to local construction costs, as follows:

Area	Funds in US dollars
Sumatra, Java, Bali and Kalimantan (excluding Jakarta Raya and provincial capitals)	6,024.10
Provincial capitals in Sumatra, Java, Bali and Kalimantan	7,228.92
Sulawesi, East and West Nusatenggara	7,228.92
Malaku	8,433.73
Irian Jaya	12,048.19
Special territory of the National Capital (Jakarta Raya)	16,867.47

1. Presidential Instruction No.6 of 1974, *Guidelines. op. cit.*

20

The three-classroom buildings and toilets of this phase of the programme were, the Instruction indicated, to be put on the same sites as the classrooms teachers' room and toilets constructed in Phase I, 1973-74, thus providing a complete, six-classroom school at each location.

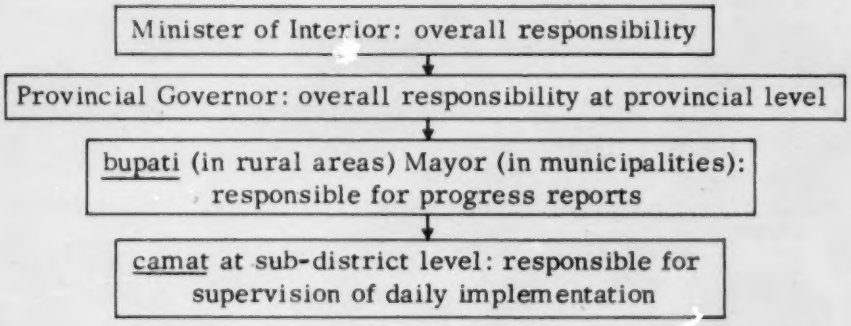
The design of the buildings was to follow that indicated in the Guidelines but, although designs were also given for furniture, the Instruction allowed flexibility on this matter, suggesting that alternative furniture would be acceptable provided it was of equal quality.

It is of interest to note that many schools were provided with furniture based on an old design and that in the East Java study of the implementation of the programme[2] it was recorded that 64 per cent of the Education Officers and 42 per cent of the teachers, being asked for an opinion on the furniture, replied that the pupils' desks were not good enough. Evidently, the study notes, it is thought, "... among educators, an acceptable standard for the school furnishings has not yet been reached."[2]

On the assignment of responsibility both for the execution of the project and for the distribution of funds, the Ministerial Instruction is, however, precise. The Minister of Interior assumes responsibility for general supervision of the implementation of the programme, and delegates to the provincial Governors responsibility for its smooth progress in their respective Provinces.

Within each Province, the Minister further delegates authority to the bupatis and mayors for reporting on the progress made. The Head of each sub-district, the camat, was delegated the ultimate responsibility for "supervision of daily implementation." The hierarchy of responsibility is shown in Figure 7.

Figure 7. Hierarchy of responsibility for project implementation


Minister of Interior: overall responsibility
Provincial Governor: overall responsibility at provincial level
bupati (in rural areas) Mayor (in municipalities): responsible for progress reports
camat at sub-district level: responsible for supervision of daily implementation

In operational terms the project was controlled in detail at the Regency (Kabupaten) or Municipality level. The head of the projects within the Kabupaten or Municipality was, respectively, the bupati or mayor. The treasurer was the Kabupaten treasurer or any other Kabupaten official deemed suitable for what was obviously to be a time-consuming task requiring considerable accounting skills,

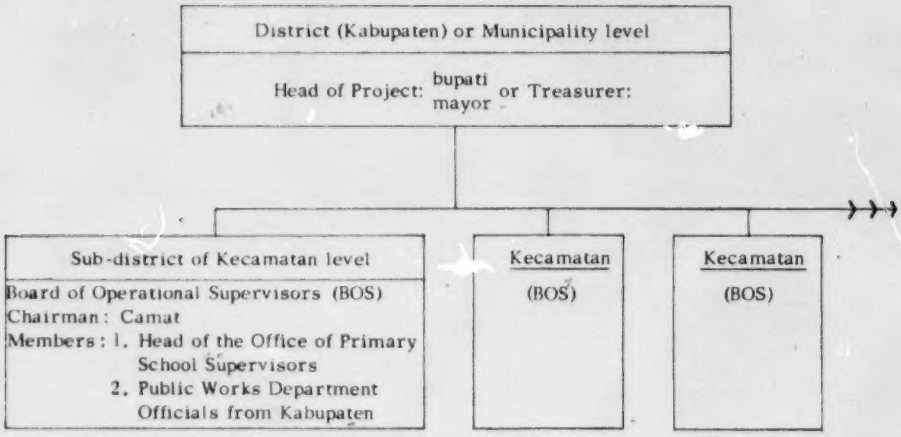
2. Proppida Kantor Wilayah Departemen P. dan K. Propinsi Jawa Timur. *op.cit.*

as will be evident from the large sums of money involved and large numbers of buildings to be put up.[3]

These two senior officials were to be assisted in their work by small, Boards of Operational Supervisors at the sub-district or Kecamatan level comprising the sub-district head or camat as Chairman and the Head of the Office of Primary School Supervisors and an official from the Office of Public Works of either the Kabupaten or the Municipality as members. These Boards were formally appointed by letters issued by the bupati in rural areas or by the mayor in the case of Municipalities.

The execution of the work was to be carried out in accordance with the very detailed Ministerial Instruction. The construction of both buildings and furniture at each separate site was to form the subject of a contract between the Head of the Project (see Figure 8), and the Head of Public Works on the one hand, and a local contractor on the other.

Figure 8. Operational arrangements for the construction and supervision of buildings


District (Kabupaten) or Municipality level
Head of Project: bupati mayor or Treasurer:
Sub-district of Kecamatan level
Board of Operational Supervisors (BOS)
Chairman: Camat
Members: 1. Head of the Office of Primary School Supervisors
2. Public Works Department Officials from Kabupaten
Kecamatan
(BOS)
Kecamatan
(BOS)

The Contract Document, which is given in full in Appendix A, formed an annex to the Ministerial Instruction and ensured uniformity of contractual conditions wherever the schools and furniture were constructed.

In Instruction of the Minister also took into account the most remote parts of Indonesia where it was unlikely that even the smallest of contractors could be found to undertake the work. In these places, provision was made for "self-managed operations". In such cases the community or local craftsmen were empowered to build the schools and manufacture furniture, but the Head of the Project was advised that purchases of materials for sums greater than US$ 1,200 should be the subject of a contract with the supplier and, where materials of value greater than US$ 4,820 were to be purchased, acquisition should be through a public tender procedure.

3. For example, in East Java the average number of buildings constructed per Kabupaten was 38 at an average government expenditure per Kabupaten of US$235,330.

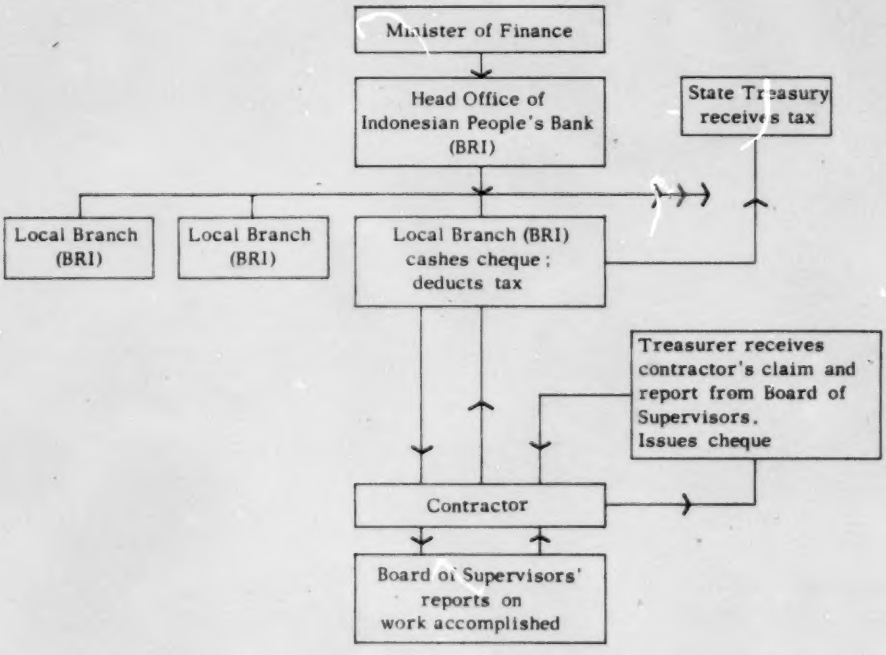
All payments made either under a contract where a contractor was available, or to self-managed projects where there was no contractor, were to be made by Letter of Authorization from the Minister of Finance. With the exception of West Irian, for which separate arrangements were prescribed, the distribution of funds was channelled from the Indonesian People's Bank to its local branch to await disbursement.

The procedure for disbursement was the subject of a paragraph of some detail in the Instruction of the Minister of the Interior.

The first payment was to be paid to the contractor after completion of 30 per cent of the work. For this, the contractor was to receive 25 per cent of the contract sum, 5 per cent being retained and paid at the end of the maintenance period (see Appendix A). The contractor had to submit to the Treasurer, with his claim for this first payment, a copy of the Contract Agreement, together with an Official Report of the progress of the work signed by two members of the Board of Operational Supervisors (see Figure 8). The form of Official Report was given in the Instruction. Subsequent intermediate payments were made on the simple submission of a claim, together with the Official Report. There was a separate form for the final handing over of the building after the 30-day maintenance period, which entitled the contractor to collect the remaining 5 per cent of the contract sum if no defects appeared after completion of the work.

Payment at each stage was made through the Treasurer by cheque on the local branch of the Indonesian People's Bank (or other banks in exceptional circumstances) and the Bank was responsible for encashment, deducting at the same time the State Income Tax that would be payable by the contractor. This tax was then credited to the State Treasury. The entire procedure is summarized in Figure 9.

Figure 9. Procedure for payment of school building and furniture contractors


Minister of Finance
Head Office of Indonesian People's Bank (BRI)
State Treasury receives tax
Local Branch (BRI)
Local Branch (BRI)
Local Branch (BRI) cashes cheque; deducts tax
Treasurer receives contractor's claim and report from Board of Supervisors. Issues cheque
Contractor
Board of Supervisors' reports on work accomplished

Finally, the Instruction of the Minister of the Interior ensured that the project as a whole, executed in 6,000 different places in the Republic, was kept under firm control by the establishment of a detailed reporting system on standard forms, through which his officials kept the central Ministry informed of progress. This system required:

1. A progress report submitted not later than the tenth of each month by the Chairman of the Board of Supervisors (the camat) to the Head of the Project (the bupati/mayor)
2. A report submitted not later than the 15th of each month by the Head of Project to the Governor.
3. A summary of monthly reports for the Province, submitted not later than the 20th of the month by the Governor to:
   a) The Minister of the Interior;
   b) The Minister of Education and Culture;
   c) The Minister of Finance;
   d) The State Minister for Economy.

In addition, the Treasurer of the Project was required to submit a statement of accountability to the Governor each month.

Thus the reporting procedures, through the Governors' reports, not only appraised the Minister of the Interior of progress but also informed the Minister of Education of developments so that the progress of the rest of the educational package could proceed in the knowledge that the buildings would be ready. They also informed the Minister of Finance of the cash that the project was consuming, month by month.

From the Report of the team that studied the implementation of the programme in East Java, it would seem that the system designed by the office of the Interior produced excellent results, as is shown by the following excerpt: "From the data on the schools built in the 56 villages in the sample, it must be concluded that the programme has been most successful in getting buildings up. Of 54 three-classroom buildings built in early 1974 (the 1973/74 Phase I) and 52 built later in the year (the 1974/75 Phase II), all but one were completed and occupied by students when visited in May 1975. The one village where the building was not finished was far from any road and had only the foundation finished."

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4. Proppipda Kantor Wilayah Departemen P. dan K. Propinsi Jawa Timur. *op.cit.*

CHAPTER SIX

PROGRESS AND PROBLEMS

Any review of the progress made in the provision of a total primary education package which, in three years, brings schooling to such a large number of children spread over such a great area in many islands, as in Indonesia, will show that the achievement is due to planning which is both comprehensive and detailed.

The plan was comprehensive because from its initiation it involved the functional participation of the six Ministries on which it depended for its implementation. These Ministries were, moreover, not only concerned with the initiation of the programme but also, through the design of the feedback mechanism, kept informed at four-weekly intervals of the progress of the award of contracts, the state of construction of buildings and furniture, the flow of cash, the handing over of completed buildings and their readiness for enrolment of children. At any stage, if progress was less than adequate, corrective action could be taken at the appropriate level.

The plan was detailed because it provided a standard procedure for undertaking each of its component actions. Thus, for the building construction programme alone, there were 11 standard documents including letters of appointment, contracts, forms for progress reporting and forms for reporting on fund allocation, cash flows and cash balances. One form even provided a space for recording obstacles which occurred during the implementation of the work.

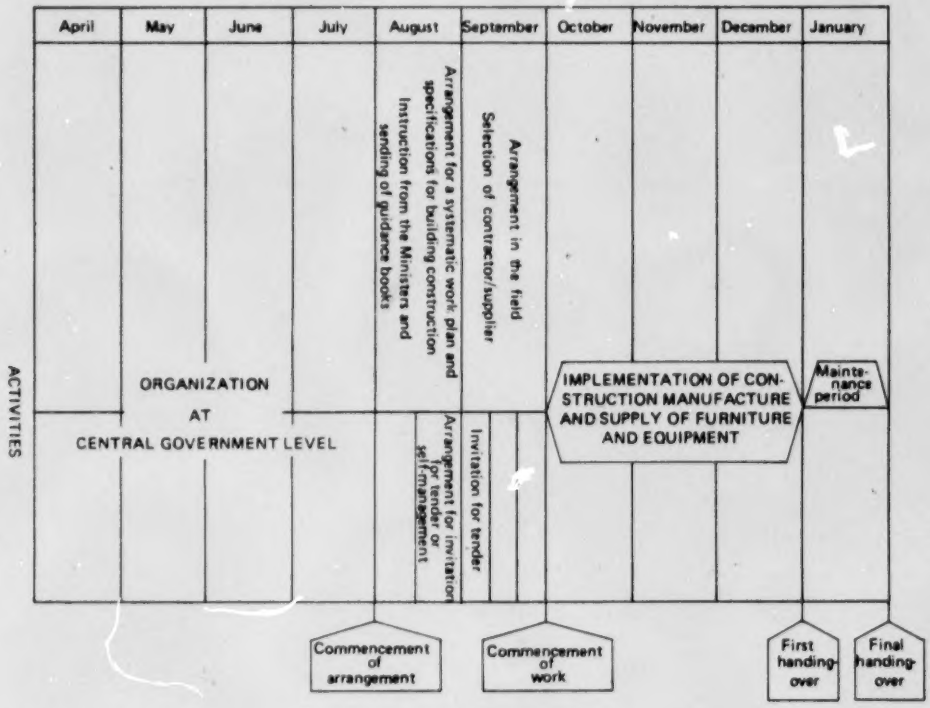
Not were the members of the public forgotten; Instruction of the Minister of the Interior No. 18 of 1974 defined precisely the design of a name board to be erected outside every INPRES school giving full details of its cost, area, capacity and construction dates.

But perhaps the most significant aspect of the entire plan was the way in which it was designed to keep everyone who was involved in its implementation aware of his or her duties for, as will be seen from Figure 10, the Guidelines, to which frequent reference has been made in this case study, were distributed to all concerned. Thereafter, all over the Republic of Indonesia, those responsible had four months in 1974 to prepare detailed work plans, select and appoint contractors and construct the buildings and furniture. That the programme, at least in respect of buildings and furniture, for which the resources were available and the results could be seen, was successfully completed suggests that the planning concepts were soundly based.

The programme was not, however, without its difficulties. The first, and most obvious, was the lack of time for implementation. Although the Presidential Instruction and the subsequent Instruction issuing jointly from the responsible Ministers were, in the case of Phase II of the programme, dated April 1974,

organization at the Central Government level, as is shown in Figure 10, took more than three months - and August was spent in making arrangements at the local level, only a very short period remained for planning and construction. The worst effect of this appears to have been experienced with the non-building components of the programme. To quote again from the East Java Report, "Library books had not been fully distributed; textbooks are still under-utilized; most teachers have attended upgrading courses but the courses have been of very short duration."[1]

Figure 10. Plan of work for construction of primary school buildings



It was probably also due to the speed at which construction had to take place that in some cases, ". . . the condition of the new buildings is not as it should be . . ."[2]

Finally, concern was expressed at the ways in which some schools were sited. While, in the majority of cases, there seems little doubt that the schools were correctly located in relation to the populations they are intended to serve, but in a number of cases sufficient to cause concern, their siting could have been improved.[3]

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1. Proppipda Kantor Wilayah Departemen P. dan K. Propinsi Jawa Timur. *op. cit.*
2. *Ibid.*
3. *Ibid.*

The Report of the Regional Integrated Educational Planning Pilot Project in East Java[4] points out that "One of the problems (of allocation of schools) was the criteria and method of determining allocation of the programme from the district (Kabupaten) to the sub-district (Kecamatan) level . . ." The Report goes on to suggest a model for allocation in which the criteria for locating schools were identified as including:

a) Population growth in the Kecamatan, 1971-74;

b) Primary school participation rate;

c) Ratio of schools to villages; and

d) Social demand for education.

The model was tried out in two Kabupaten with encouraging results.

From the viewpoint of this case study, perhaps one of the most significant aspects is that at the regional level the educational planning units are making and publishing studies of implementation. The philosophy of the East Java Planning Pilot Project is perhaps best summed up in the words of one of its authors: "The problems identified here are issues that remain to be dealt with in order to perfect an already successful programme."

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4. Proppipda Kantor Wilayah Departemen P. dan K. Propinsi Jawa Timur. *Experience in East Java on primary school location.* Surabaya, October 1975.

APPENDIX

SAMPLE OF CONTRACT AGREEMENT

CONTRACT AGREEMENT OF THE
PROJECT OF AID FOR THE CONSTRUCTION OF PRIMARY SCHOOL BUILDINGS

No. _ _ _ _ _

Today _ _ _ _ _ _, date _ _ _ month _ _ _ _ _ _ _ one thousand nine hundred seventy _ _ _ _ _

1. _ _ _ _ _ _ _ _ _ _ _ _ _ _ _, *Bupati* of *Kabupaten*/Mayor of Municipality _ _ _ _ _ _ _ _ _ _ as Head of INPRES Project of Aid for Construction of Primary School Buildings, according to the Letter of Decision from the Governor of _ dated _ No. _ _ _ _ _ _ acting on behalf of the Government of the Republic of Indonesia as State Representative, hereafter called the FIRST PARTY, and

2. _ _ _ _ _ _ _ _ _ _ _ _ _ _ _, Director contracting Firm _ _ _ _ _ _ _ _ _ _ _ _ _ _ _ _ _ _ according to the notary public certificate _ _ _ _ _ _ _ _ _ _ _ dated _ No. _ _ _ _ _ _ located in No. _ _ _ _ _ _, _ _ _ _ _ _ _ _ Road, acting on behalf and for the said Enterprise, hereafter called the SECOND PARTY,

Hereby declare they have made a joint agreement to carry out the implementation of the work, according to the Letter of Assginment of the FIRST PARTY dated _ _ _ _ _ _ _ _ _ _ _ _ _ _ _ No. _ _ _ as stated in the following articles:

Article 1

ASSIGNMENT

The First Party in his competency as named above, gives the assignment to the Second Party, and the Second Party accepts the assignment to execute the construction which covers the following work:

1.1. Primary School buildings consisting of:

a) _ _ _ _ _ (_ _ _ _ _) classrooms @ 54 m^2

b) Toilet room (W.C.)

1.2. School equipment and furniture for _ _ _ _ _ (_ _ _ _ _) pupils and _ _ _ _ _ (_ _ _ _ _) teachers, consisting of:

a) _ _ _ _ _ (_ _ _ _ _) tables for pupils

b) _ _ _ _ _ (_ _ _ _ _) chairs for pupils

c) _ _ _ _ _ (_ _ _ _ _) chalkboards

d) _ _ _ _ _ (_ _ _ _ _) tables for teachers

e) _ _ _ _ _ (_ _ _ _ _) cupboards

f) _ _ _ _ _ (_ _ _ _ _) chairs for teachers

Located in : _ _ _ _ _ _ _ _ _ _ _ _ _ _ _ _

Road : _ _ _ _ _ _ _ _ _ _ _ _ _ _ _ _

Village : _ _ _ _ _ _ _ _ _ _ _ _ _ _ _ _

Sub-district : _ _ _ _ _ _ _ _ _ _ _ _ _ _ _ _

District/Municipality : _ _ _ _ _ _ _ _ _ _ _ _ _ _ _ _

Article 2

BASIC CONDITION FOR THE EXECUTION OF WORK

The work mentioned in Article 1 should be implemented according to:

2.1. The drawings (including details) and the specifications which with all the alterations, conform to the Official Report of Clarification, and become an annex to and cannot be separated from the Contract Agreement.

2.2. All administrative and technical stipulations/regulations which are stated in:

2.2.1. General Conditions for the execution of the Contract of the Office of Public Works (Algemeene Voorwaarden voor de uitvoering bij aanneming van Openbare Werken A.V.) which is certified by the letter of Governmental decision on 28 May 1941 and the Supplement of Official Gazette No. 14571.

2.2.2. The General Regulation for the Examination of Building Materials (PUBB) for the execution of buildings in Indonesia.

2.2.3. The Regulation for Construction work for local Regional Government.

2.2.4. General Regulation for Electricity (Algemeene Voorschriften voor Electriciteit A.V.E.) and the current regulation of the State Electricity Authority.

2.2.5. The Current Regulations for Concrete frame Construction.

2.2.6. The Directives and Warnings either oral or written from the Management as stated in Article 1 to meet the objectives of the Contract Agreement.

Article 3

THE PERIOD OF IMPLEMENTATION

3.1. The work should start within seven days at the latest after the assignment has been issued by the First Party.

3.2. The implementation of the construction stated in the contract should be finished and handed over for the first time on (date) _ _ _ _ _ _ _ _ _ _ _ _ at the latest. If the Second Party proposes a delay in handing over in a written demand comprising reasonable arguments, the First Party may grant extension by a written consent to the Second Party.

Article 4

THE PERIOD OF MAINTENANCE

The maintenance of the buildings is still the responsibility of the Second Party within the period of 30 days beginning from the day of the first handing over, and if the First Party is not satisfied because of damages or defects, it is the responsibility of the Second Party to make repairs. If the Second Party does not make the required repairs, the First Party may order a Third Party to make the repairs and the cost will be charged to the Second Party.

Article 5

THE ACTUAL COST OF THE CONTRACT

The amount of the actual cost of the Contract under Article 1 is _ _ _ _ _ _ _ _ _ _ rupiahs.

Article 6

PAYMENT PROCEDURES

Payment of the actual cost under Article 5 is to be in instalments as follows:

1. A first instalment of 25% of the actual cost of Contract or _____ rupiahs when the value of the completed work done represents 30% of the actual cost.
2. A second instalment of 30% of the actual cost of the Contract or _____ rupiahs when the value of the completed work done represents 60% of the actual cost.
3. A third instalment of 20% of the actual cost of the Contract or _____ rupiahs when the value of the completed work done represents 80% of the actual cost.
4. A fourth instalment of 20% of the actual cost of the Contract or _____ rupiahs when the work is 100% finished and handed over for the first time.
5. A fifth instalment of 5% of the actual cost of the Contract or _____ rupiahs at the end of the maintenance period when the building is finally handed over.

Article 7

FINES AND CONSEQUENCES

Fine for delay:

When the first handing over of work is not within the time stated under Article 3, the Second Party must pay a fine of Rp. 5,000.- (Five thousand rupiahs) for each day of delay up to a maximum of 2½% of the actual cost of the Contract; this special clause is applicable only for delays regardless of what has been stated under Article 2.

Fine for negligence:

When the Second Party ignores the regulation of work conditions/or does not obey the instructions from the First Party, a fine of Rp. 5,000.- (Five thousand rupiahs) must be paid for any single negligence and consequently the Second Party is responsible to repair damage caused by carelessness.

Article 8

VARIATIONS IN WORK

Deviations or alterations that will result in causing additional work or a reduced amount of work are to be performed only when the First Party/Management gives a written instruction explaining the type and details of work.

Furthermore, calculation for additional work or for a reduced amount of work are calculated on the basis of price agreed by both parties if not specified in a table of unit costs.

Article 9

INCREASE IN PRICES AND 'FORCE MAJEURE'

When unexpected events beyond the control of the Second Party happen during the course of construction (earthquake, flood, war etc.) so that the Second Party suffers a loss, the Second Party has the right to ask for consideration from the First Party to compensate for the loss. A loss as a result of an increase in prices of building materials or wages is the responsibility of the Second Party.

Article 10

CALCELLATION OF CONTRACT

10.1 In accordance with article 62 sub 3 of A.V., the First Party has the right to cancel the contract agreement when it is proved that the Second Party has sub-contracted the entire construction to a Third Party.

10.2 The First Party has the right to cancel the contract agreement when it considers that the Second Party is incapable of undertaking the construction assigned under Article 1.

Article 11

SUPERVISORS FOR CONSTRUCTION

11.1 Supervision is performed by the Board of Operational Supervisors which is appointed by a Letter of Decision of the First Party. The Board comprises Head of *Kecamatan* as Chairman, an official from Public Works Office of the *Kabupaten* or other official appointed by him, and Head of *Kecamatan* Office of School Supervisors or other official appointed by him, as members.

11.2 The duties of Supervisors are:

a) To supervise the implementation of work done by the contractor, in order to conform with the stipulations on administration, construction and design.

b) To make Official Reports on the development and completion of work (for instalment), a statement that work is completely finished, and handing over of the work.

c) To make a daily, weekly and monthly progress report in the framework of composing a periodic report on the development of physical target achieved.

Article 12

IMPLEMENTATION BY THE SECOND PARTY AND FIELD EQUIPMENT

A representative of the Second Party who is appointed as an executor and has full authority and is capable of executing orders from the Management should be present continuously on the construction site.

A representative who is appointed by the Second Party has to be approved by the Management.

Article 13

SECURITY

13.1 The Second Party is responsible for the safety of workers during execution of work.

13.2 The Second Party is responsible for taking precautions against injuries which might happen to the workers who are undertaking their work; and if an accident occurs the Second Party is responsible for all consequences of the accident.

13.3 The Second Party has to build a store room to keep materials and tools needed for the work. To avoid theft, it is necessary to provide an adequate guard for the store room.

Article 14

TAX STAMPS

The tax stamp of the contract agreement is 1% (one per cent) of the actual cost of the contract or Rp. _ _ _ _ _ _ _ (_ _ _ _ _ _ _ rupiahs) and is to be deposited with the State Treasury, and charged to the Second Party.

Article 15

DISAGREEMENT

15.1 Disagreements on technical matters will be settled by an Arbitration Committee comprising one representative from the First Party, one from the Second Party and one from a Third Party chosen by both parties. Disagreements other than on technical aspects of the contract will be brought to the District Court.

15.2 Both parties choose a permanent place in the Secretariat of District Court at _ _ _ _ _ to take care of all consequences of the contract agreement.

Article 16

This Contract Agreement is made and signed by both Parties at _ _ _ _ _ _ _ _ _ _ _ _ _ _ _ _ _ _, on the day, month and year stated above. Sufficient tax stamps are affixed to the 2 (two) original copies. 15 (fifteen) extra copies are to be available for administrative purposes.

FIRST PARTY The *Bupati*/Mayor	SECOND PARTY Director Contracting Firm
_ _ _ _ _ _ _ _ _ _ _ _ _ _ _ _ _ _ _ _	_ _ _ _ _ _ _ _ _ _ _ _ _ _ _ _ _ _ _ _
As Head of Project for the Construction of Primary School Buildings	
(_ _ _ _ _ _ _ _ _ _ _ _ _)	(_ _ _ _ _ _ _ _ _ _ _ _ _)
1. Witnessed: Head of Public Works Office of *Kabupaten*	2. Witnessed:
(_ _ _ _ _ _ _ _ _ _ _ _ _)	(_ _ _ _ _ _ _ _ _ _ _ _ _)